







UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER OF PATENTS AND TRADEMARKS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/592,751	06/13/2000	Nick Kalageros	60.130-709	5781
26096 75	90 05/22/2003			
CARLSON, GASKEY & OLDS, P.C. 400 WEST MAPLE ROAD SUITE 350			EXAMINER	
			CARPENTER, SCOTT A	
BIRMINGHAM, MI 48009			ART UNIT	PAPER NUMBER
			3612	
			DATE MAILED: 05/22/2003	DATE MAILED: 05/22/2003

Please find below and/or attached an Office communication concerning this application or proceeding.



Commissioner for Patents
United States Patent and Trademark Office
P.O. Box 1450
Alexandria, VA 22313-1450
www.uspto.gov

BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Paper No. 16

Application Number: 09/592,751

Filing Date: June 13, 2000

Appellant(s): KALAGEROS ET AL.

MAILED

MAY 22 2003

GROUP 3600

Kerrie Laba For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed 4/21/03.

(1) Real Party in Interest

Art Unit: 3612

A statement identifying the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

A statement identifying the related appeals and interferences which will directly affect or be directly affected by or have a bearing on the decision in the pending appeal is contained in the brief.

(3) Status of Claims

The statement of the status of the claims contained in the brief is correct.

(4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Invention

The summary of invention contained in the brief is correct.

(6) Issues

The appellant's statement of the issues in the brief is correct.

(7) Grouping of Claims

Appellant's brief includes a statement that claims 1, 2, 3, 4, 32, 33, 14, 15, 16, 34, 35, 20, 21, 23, 24, 36, and 37 do not stand or fall together and provides reasons as set forth in 37 CFR 1.192(c)(7) and (c)(8). Additionally, claims 10 and 11 stand or fall with claim 3, and claim 22 stands or falls with claim 21.

(8) Claims Appealed

The copy of the appealed claims contained in the Appendix to the brief is correct.

(9) Prior Art of Record

Application/Control Number: 09/592,751 Page 3

Art Unit: 3612

5,165,627 AMANO ET AL. 11-1992

5,707,697 SPAIN 1-1998

4,950,522 VOGT ET AL. 8-1990

(10) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claims 1, 2, 32, and 33 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Amano et al. in U.S. Patent 5,165,627. This rejection is set forth in prior Office Action, Paper No. 12.

Claims 3, 4, 10, 11, 14-16, 20-24, and 34-37 are rejected under 35 U.S.C. 103(a) as being unpatentable over Spain et al. (U.S. Patent 5,707,697) in view of Amano and Vogt et al. (U.S. Patent 4,950,522). This rejection is set forth in prior Office Action, Paper No. 12.

(11) Response to Argument

Claim 1

As stated in the final rejection, Amano et al. (Amano hereafter) teaches each and every limitation of claim 1, and therefore clearly anticipates claim 1.

The Examiner would first like to point out that an airplane is, in fact, a vehicle. Also, a fuselage is part of the body of the airplane, and therefore a fuselage panel is, in fact, a vehicle body panel. Furthermore, because of the anisotropic nature, the panel would - in fact - crumple in a predetermined manner when subjected to an impact force. The Examiner would also like to point out that in general, any vehicle panel would crumple in a predetermined manner when subjected to a predetermined force.

Art Unit: 3612

Second, the corrugations of Amano can be broadly interpreted (see MPEP § 2111) as being reinforcing in nature. The corrugations in the walls of Amano (which are spaced) increase the area moment of inertia and - if even to only a small extent - help resist buckling under a load in the axial direction.

A recitation of the intended use (crumples in a predetermined manner) of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. See *In re Casey*, 152 USPO 235 (CCPA 1967) and *In re Otto*, 136 USPQ 458, 459 (CCPA 1963).

Claim 2

As stated in the final rejection, Amano discloses that the material can be made of fiber reinforced plastics - i.e. a composite panel which is a polymer sheet with reinforcing fibers in it.

Claim 32

Appellants' argue that the panel of Amano is not "generally planar," and gives the definition of planar. First, Appellants' don't use the term "planar," they use the term "generally planar," (for emphasis). From the drawings and specification, the vehicle upon which these panels may be used has curved and blended surfaces (otherwise it would be a brick-shaped vehicle). Clearly, one of ordinary skill in the art would recognize that Appellants' use of the term "generally planar" includes surfaces which are mildly curved, and that the scope of claim 32 would include panels which may be mildly curved. The panel of Amano is mildly curved, and falls within the scope of Appellants' use of the term "generally planar."

Claim 33

Art Unit: 3612

Amano clearly has the capability to be deformed in the manner as claimed a point which Appellants' don't contest. From §2131 of the MPEP: "A claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." Verdegaal Bros. v. Union Oil Co. of California, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir. 1987). In the instant case the capability of Amano do deform in the recited manner is an inherent feature.

Claims 3 and 10-11

Appellants' first argue that Amano is not relevant art. The examiner would point out that claim 1 (from which claim 3 depends) recites only a "vehicle body panel." As discussed above, Amano teaches a vehicle body panel.

Appellants' singly argue the deficiencies of Amano. This is not persuasive because the reference was based on a combination of references. One cannot show nonobviousness by attacking references individually where the rejections are based on combinations of references. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981); *In re Merck & Co.*, 800 F.2d 1091, 231 USPQ 375 (Fed. Cir. 1986).

Appellants' then argue that the combined references fail to teach or suggest a motivation to combine. This is not persuasive. The motivation to combine the references is discussed in the final rejection. Additionally, the strongest rationale for combining references is a recognition, expressly or impliedly in the prior art or drawn from a convincing line of reasoning based on established scientific principles or legal precedent, that some advantage or expected beneficial result would have been produced by their combination. In re Sernaker, 702 F.2d 989, 994-95, 217 USPQ 1, 5-6 (Fed. Cir. 1983).

Page 6

Application/Control Number: 09/592,751

Art Unit: 3612

In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., intended use of reducing pedestrian injuries) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

In response to applicant's argument that the examiner's conclusion of obviousness is based upon improper hindsight reasoning, it must be recognized that any judgment on obviousness is in a sense necessarily a reconstruction based upon hindsight reasoning. But so long as it takes into account only knowledge which was within the level of ordinary skill at the time the claimed invention was made, and does not include knowledge gleaned only from the applicant's disclosure, such a reconstruction is proper. See *In re McLaughlin*, 443 F.2d 1392, 170 USPQ 209 (CCPA 1971). Spain, Amano, and Vogt all teach vehicle body panels.

Appellants' lastly argue that the combined references do not teach all of the limitations of claim 3. Appellants' basis for this argument is the position that the features shown by Amano (Figs. 3-6) do not, in their belief, constitute the reinforcements as claimed. In fact, Appellants' recited nothing more than "spaced reinforcements" with accompanying function language. The structures taught by Amano are within the scope of this limitation (as discussed above), and therefore the combination is not deficient.

Claim 4

As discussed in the final rejection, Amano teaches spaced reinforcing fibers. A composite panel is a polymeric sheet of material with reinforcing fibers in it. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Application/Control Number: 09/592,751 Page 7

Art Unit: 3612

Claim 14

Claim 14 recites essentially the same subject matter as claim 3, and is not allowable for the same reasons as claim 3.

Claim 15

Claim 15 recites essentially the same subject matter as claim 4, and is not allowable for the same reasons as claim 4.

Claim 16

As discussed in the final rejection, Amano shows (Fig. 10) fibers arranged in laterally space rows. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 34

As stated in the final rejection, the gap between the fibers running horizontally (Amano - Fig. 10) comprise areas of lower fiber concentration, and the fibers themselves represent areas of high fiber concentration. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 35

Amano teaches that the rows of fibers alternate in a linear or generally planar direction at regular intervals. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 20

Claim 20 recites essentially the same limitations as claim 14 except Appellants' recite first and second sections having first and second deformabilities (one less than the other). The

Application/Control Number: 09/592,751 Page 8

Art Unit: 3612

spaced reinforcements of Amano are well within the scope of such limitations, and accordingly, the combination of Spain, Amano, and Vogt teach all of the limitations of the claim.

Claim 21 and 22

All of the language of the claim was considered and afforded the proper patentable weight. Appellants' argue individually against the deficiencies of Spain, Amano, and Vogt. As discussed above, this is improper because the rejection is based on a *combination* (for emphasis) of references - not a single reference. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 23

As stated in the final rejection, the gap between the fibers running horizontally (Amano - Fig. 10) comprise areas of lower fiber concentration, and the fibers themselves represente of high fiber concentration. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 24

Amano teaches that the rows of fibers alternate in a linear or generally planar direction at regular intervals. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Claim 36

As stated in the final rejection, the gap between the fibers running horizontally (Amano - Fig. 10) comprise areas of lower fiber concentration, and the fibers themselves represent areas of high fiber concentration. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

Art Unit: 3612

Claim 37

Amano teaches that the rows of fibers alternate in a linear or generally planar direction at regular intervals. The combined references teach or suggest all of the claim limitations - as discussed in the final rejection.

(12) Conclusion

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

SCOTT CARPENTER
PATENT EXAMINED

sac

May 14, 2003

Conferees

,

CARLSON, GASKEY & OLDS 400 W. MAPLE ROAD SUITE 350 BIRMINGHAM, MI 48009 D. GLENN DAYOAN 3 (1967)
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 3600

Claim Tree - Appealed Claims





